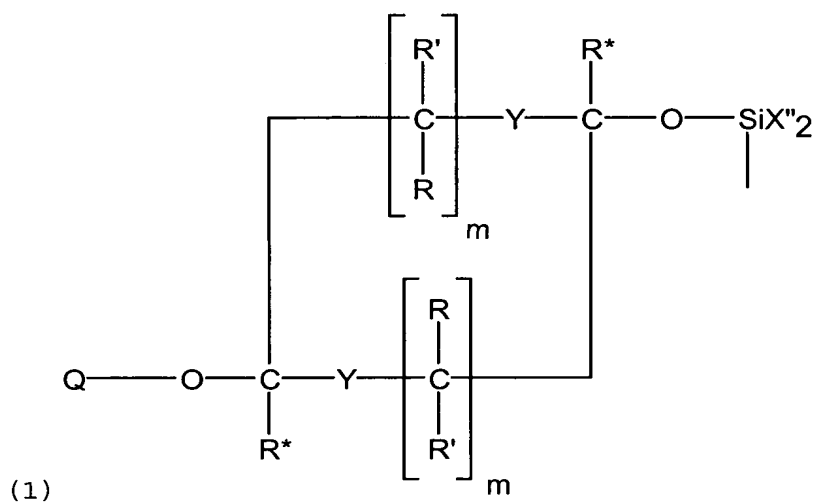
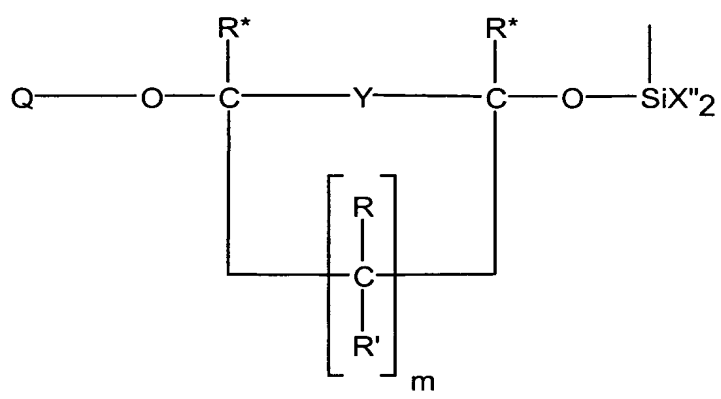
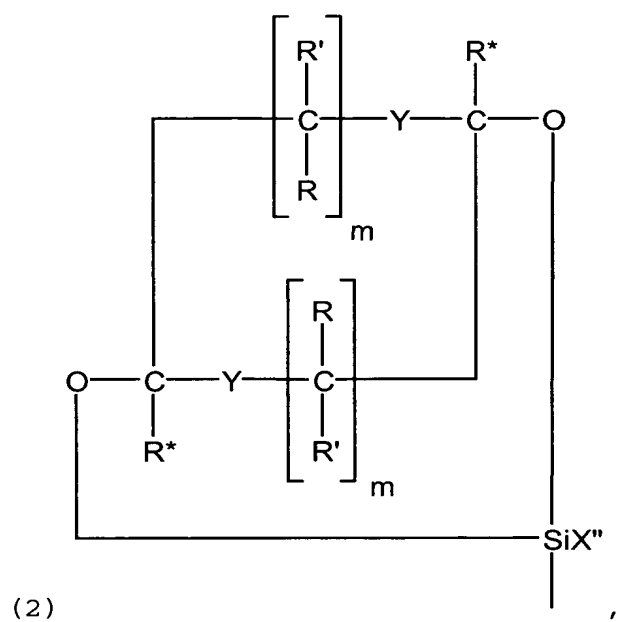
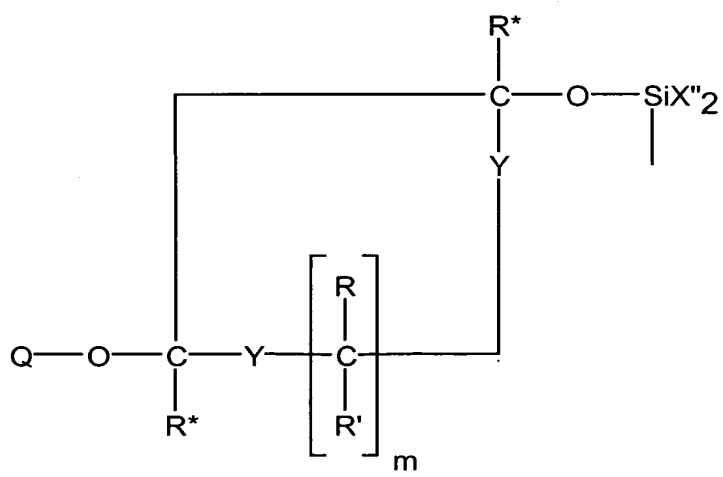
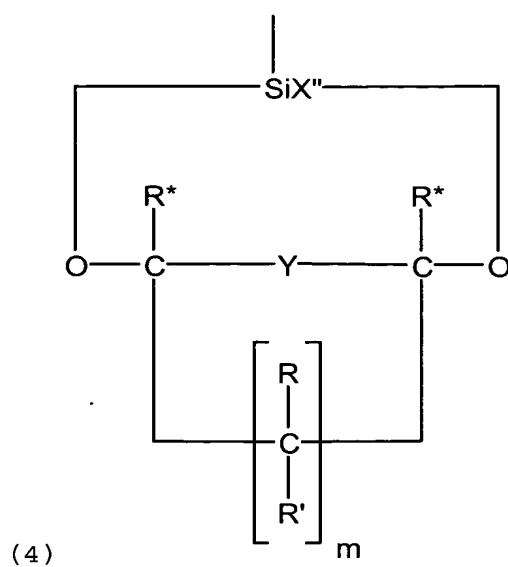


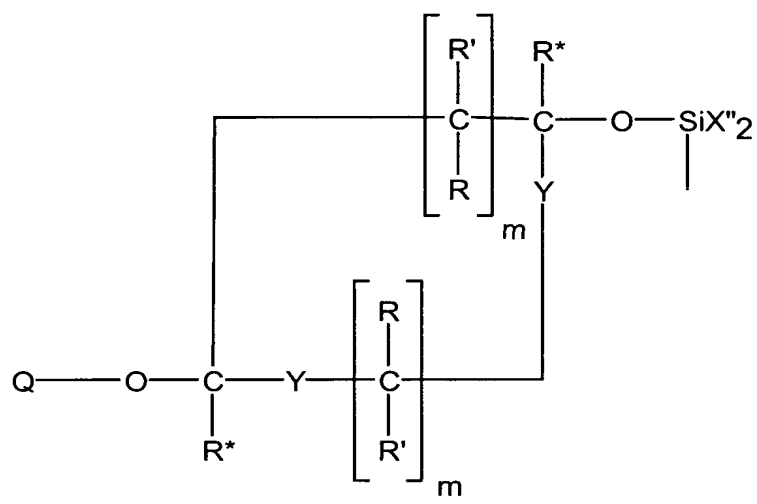
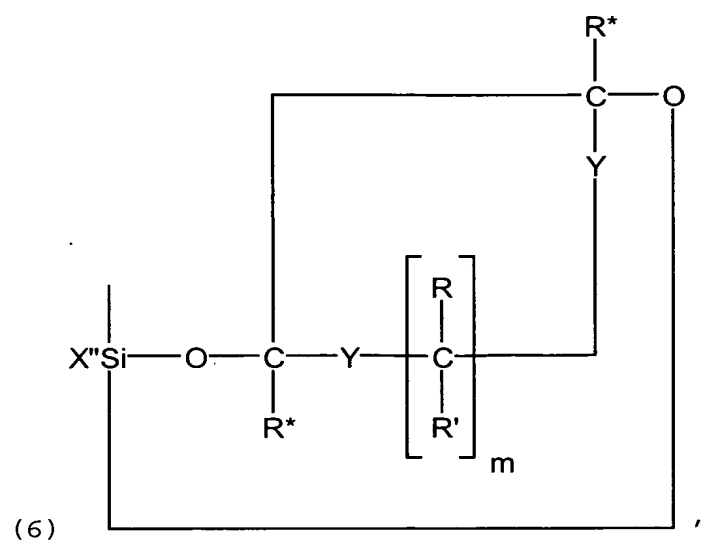
WHAT IS CLAIMED IS:

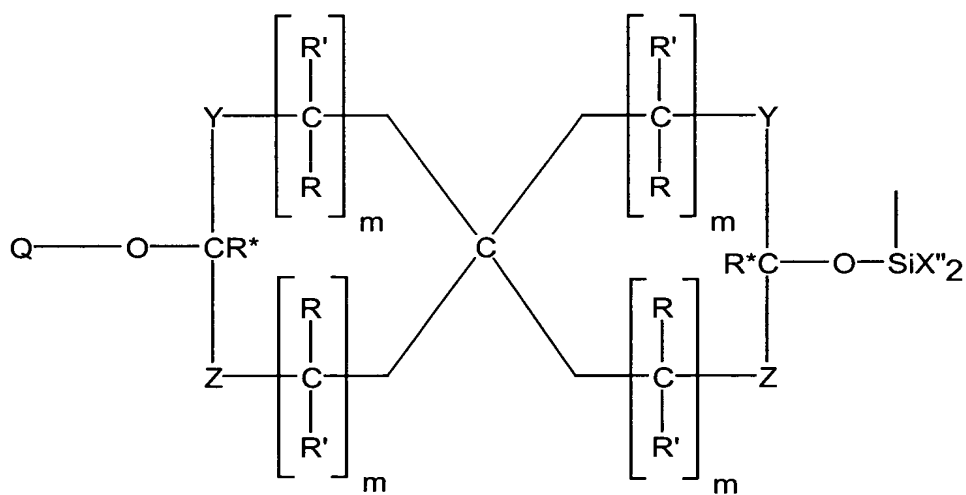
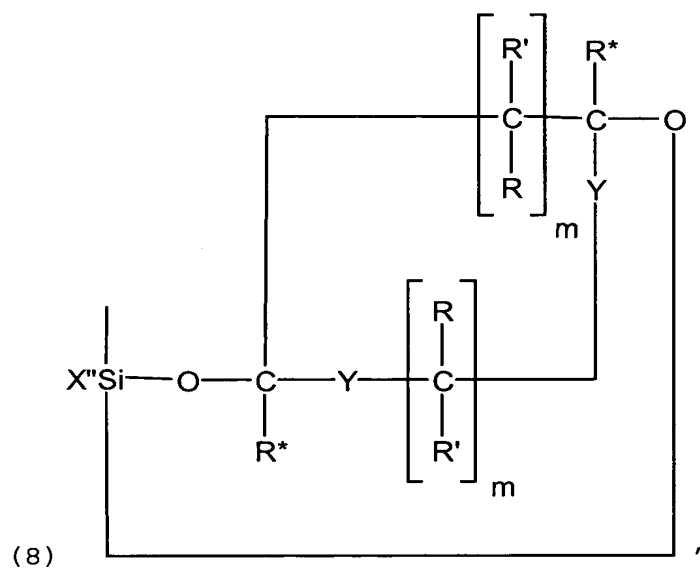
1. A polymer which is comprised of polymer chains having at least one modified silane moiety bonded thereto, wherein said modified silane moiety is of a structural formula selected from the group consisting of:



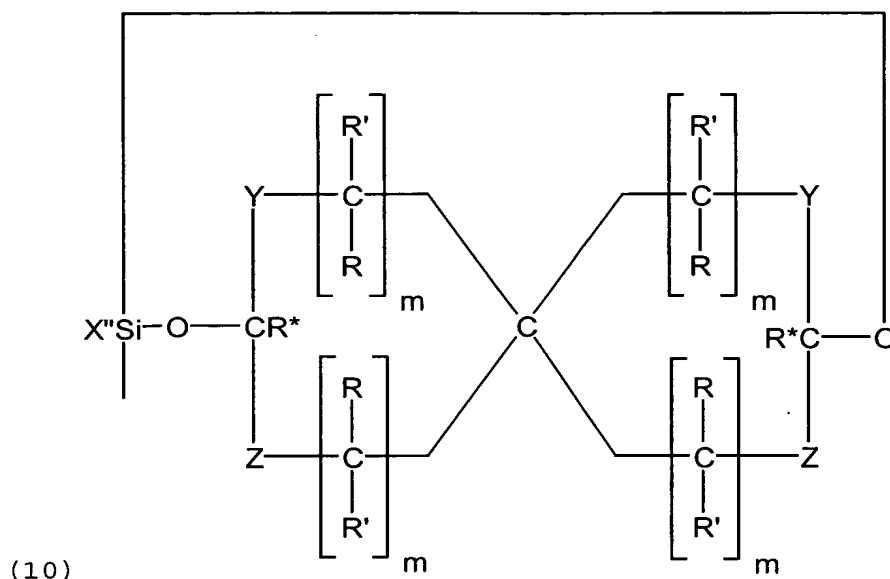








and

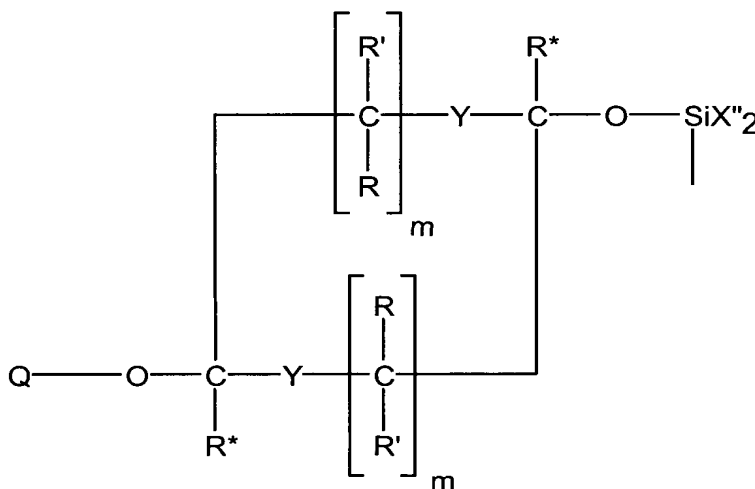


wherein m represents an integer from 1 to about 20; wherein  
X'' groups can be the same or different; wherein X''  
5 represents a chemical moiety; wherein Q is selected from  
the group consisting of hydrogen atoms and X''<sub>2</sub>Si-; wherein R  
and R' can be the same or different and are selected from  
the group consisting of hydrogen atoms, alkyl groups  
containing from 1 to about 12 carbon atoms, aryl groups  
10 containing from about 6 to about 18 carbon atoms, alkaryl  
groups containing from 7 to about 18 carbon atoms, alkoxy  
groups containing from 1 to about 18 carbon atoms, hydroxy  
groups, and halide atoms; wherein R\* is selected from the  
group consisting of hydrogen atoms, alkyl groups containing  
15 from 1 to about 12 carbon atoms, aryl groups containing  
from about 6 to about 18 carbon atoms, and alkaryl groups  
containing from 7 to about 18 carbon atoms; wherein R, R',  
and R\* can be bonded together in any combination in cases  
where R, R', R'', and R\* are not hydrogen atoms, halide  
20 atoms, or hydroxy groups; wherein Y represents a moiety  
selected from the group consisting of oxygen, sulfur,  
nitrogen, and phosphorus; wherein Z represents a moiety

selected from the group consisting of C(R)R', oxygen, sulfur, nitrogen, and phosphorus; wherein the contiguous cyclic ring in formulas (1), (2), (3), (4), (5), (6), (7), (8), (9), and (10) can contain heteroatoms selected from the group consisting of oxygen, sulfur, nitrogen, phosphorus, and silicon in cases where m represents an integer greater than 1; wherein the contiguous cyclic ring in formulas (1), (2), (3), (4), (5), (6), (7), (8), (9), and (10) can be saturated or unsaturated in cases where m represents an integer greater than 1; wherein said alkyl groups, aryl groups, alkaryl groups, and alkoxy groups can contain halide atoms and heteroatoms selected from the group consisting of oxygen, sulfur, nitrogen, phosphorus, and silicon.

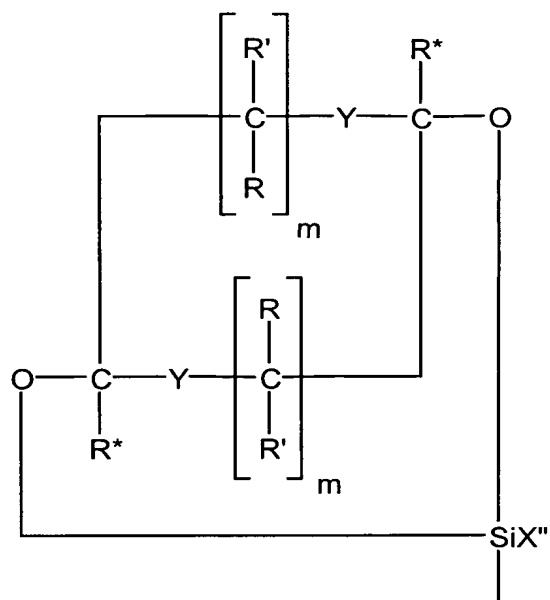
15

2. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:



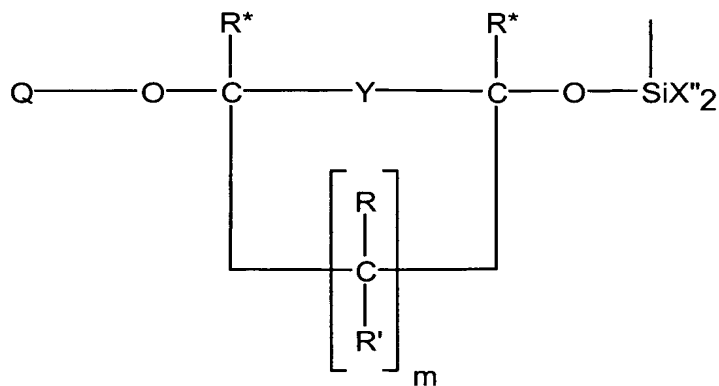
20

3. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:



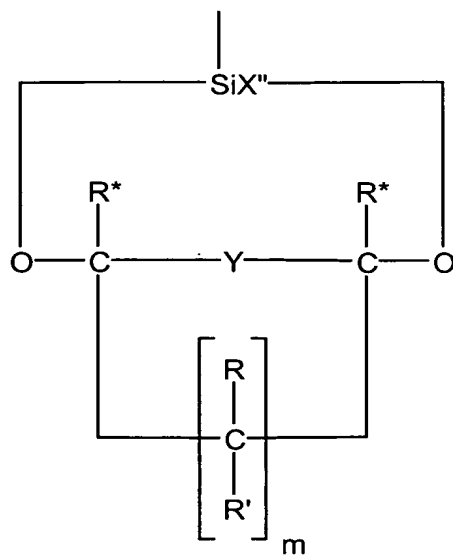
4. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

5



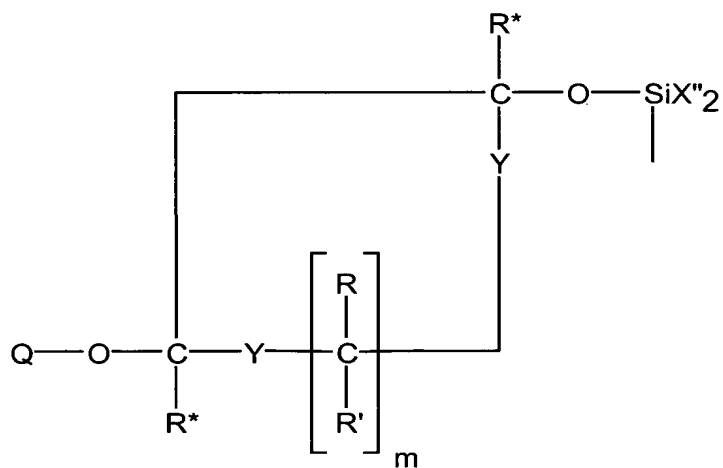
5. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

10



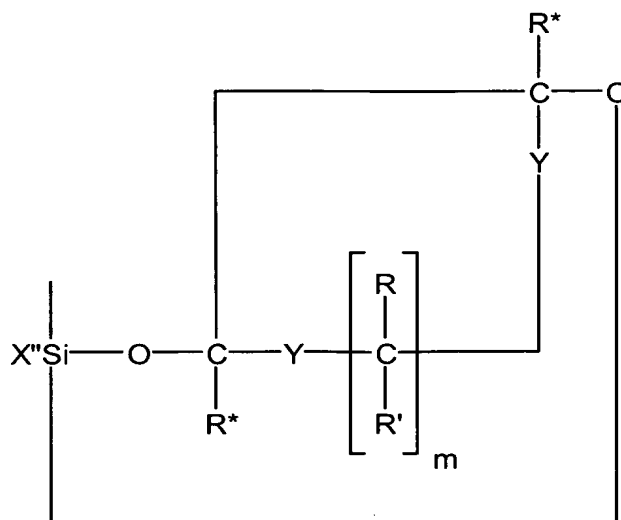
6. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

5



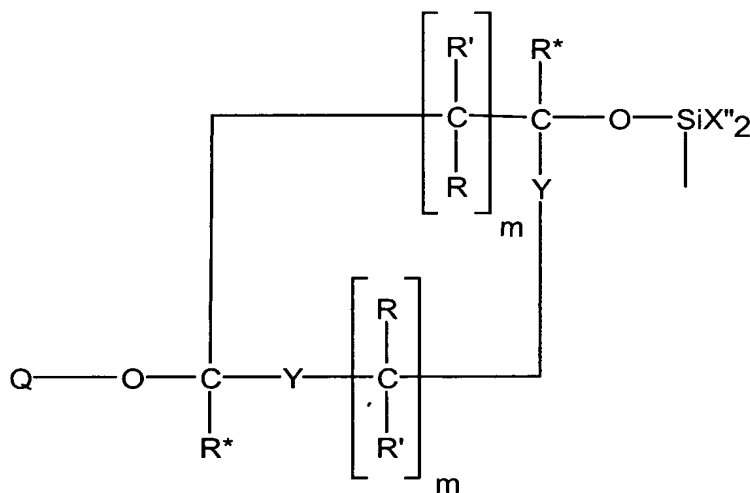
7. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

10



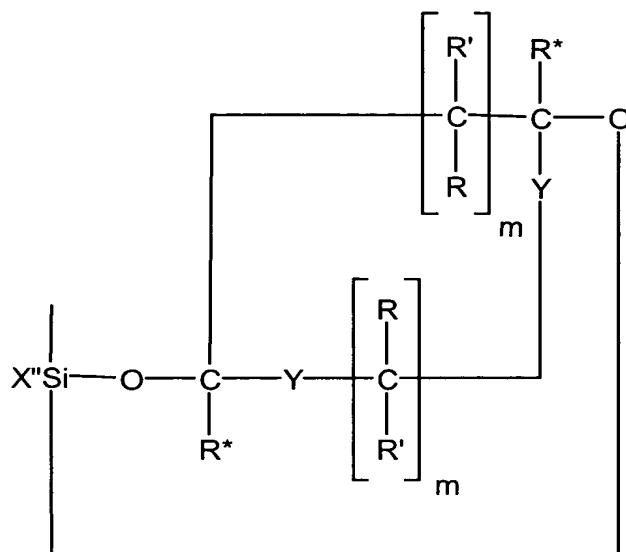
8. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

5



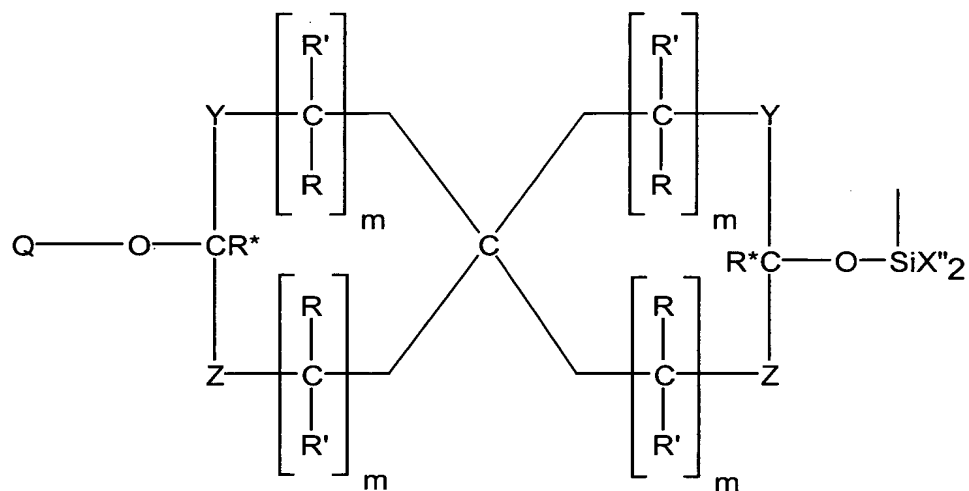
9. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

10



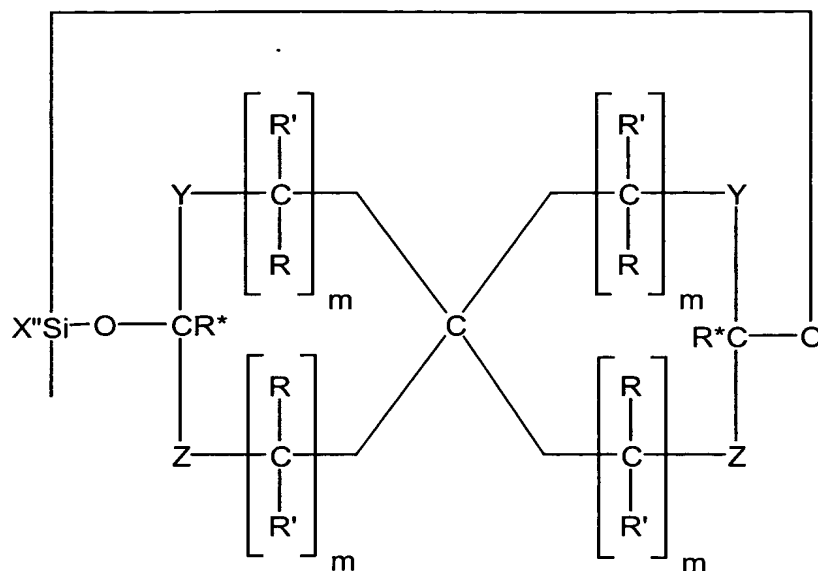
10. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

5



11. A polymer as specified in claim 1 wherein the modified silane moiety is of the structural formula:

10



12. A polymer as specified in claim 2 wherein Y is oxygen.

5

13. A polymer as specified in claim 3 wherein Y is oxygen.

10 14. A polymer as specified in claim 4 wherein Y is oxygen.

15 15. A polymer as specified in claim 5 wherein Y is oxygen.

16. A polymer as specified in claim 6 wherein Y is oxygen.

17. A polymer as specified in claim 7 wherein Y is oxygen.

20

18. A polymer as specified in claim 8 wherein Y is oxygen.

19. A polymer as specified in claim 9 wherein Y is oxygen.

5        20. A polymer as specified in claim 10 wherein Y is oxygen and Z is  $C(R)R'$ .